

COMMONWEALTH of VIRGINIA

DEPARTMENT OF FORENSIC SCIENCE

CENTRAL LABORATORY A Nationally Accredited Laboratory

700 NORTH 5TH STREET RICHMOND, VIRGINIA 23219 (804) 786-6971

CERTIFICATE OF INSTRUMENT ACCURACY

INSTRUMENT:

Intox EC/IR II

SERIAL NUMBER:

010570

CERTIFICATION DATE:

April 10, 2014

DATE RECERTIFICATION DUE:

October 7, 2014

The above listed instrument was found to meet all requirements for accuracy and performance established by the Department of Forensic Science as required by §9.1-1101 (B)(3). Measurement traceability is established through the use of reference materials supplied by an ISO/IEC 17025:2005 accredited calibration laboratory.

Estimation of Uncertainty of Measurement:

 $0.020 \pm 0.004 \text{ g/}210 \text{ L}$

 $0.150 \pm 0.007 \text{ g/}210 \text{ L}$

 $0.080 \pm 0.004 \text{ g/2} \cdot 10 \text{ L}$

 0.250 ± 0.007 g/210 L

The Uncertainty of Measurement is reported at the 99.73% level of confidence and a coverage factor of k=3. The estimation of the Uncertainty of Measurement is calculated for the Certification process only.

Michelle M. Billeter

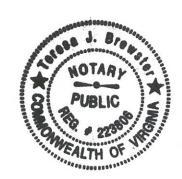
Forensic Scientist

CITY OF RICHMOND COMMONWEALTH OF VIRGINIA

The foregoing was acknowledged before me this 21st day of by Michelle M. Billeter

Teresa J. Brewster, Notary Public

My commission expires: April 30, 2017



Department of Forensic Science Breath Alcohol Section Instrument Maintenance History 1/1/1990 To 4/14/2014



| Instrument Serial Number: | | 010570 | As of 14-Apr-14 |
|---------------------------|---------------|-------------|---|
| Maintenance | Certification | Technician | |
| Date | Date | Initials | Remarks |
| 10-Apr-14 | 10-Apr-14 | HMS (18910) | CERTIFIED |
| 08-Jan-14 | 29-Oct-13 | DBH (21250) | REPLACED UPS BACK-UP BATTERY. |
| 29-Oct-13 | 29-Oct-13 | DBH (21250) | FIRMWARE/SOFTWARE UPGRADE. CALIBRATED AND CERTIFIED. REPLACED DRY GAS STANDARD. |
| 14-May-13 | 14-May-13 | DBH (21250) | CERTIFIED. |
| 27-Nov-12 | 27-Nov-12 | SED (24178) | FIRMWARE/SOFTWARE UPGRADE. CALIBRATED AND CERTIFIED. REPLACED DRY GAS STANDARD. |
| 09-Aug-12 | 09-Aug-12 | DBH (21250) | CERTIFIED |
| 30-Jul-12 | 30-Jul-12 | HMS (18910) | REPLACED AND TESTED FUEL CELL MODULE, CALIBRATED AND CERTIFIED. |
| 06-Feb-12 | 06-Feb-12 | HMS (18910) | CERTIFIED, REPLACED DRY GAS STANDARD. |
| 18-Aug-11 | 18-Aug-11 | HMS (18910) | CERTIFIED |
| 10-Mar-11 | 10-Mar-11 | HMS (18910) | REPLACED DRY GAS STANDARD, CERTIFIED |
| 29-Sep-10 | 29-Sep-10 | HMS (18910) | CERTIFIED |
| 22-Jun-10 | 13-Apr-10 | RJP (22428) | REPLACED DRY GAS STANDARD. |
| 13-Apr-10 | 13-Apr-10 | HMS (18910) | REPLACED DRY GAS STANDARD, CERTIFIED |
| 28-Oct-09 | 28-Oct-09 | RJP (22428) | CERTIFIED. |
| 16-Jun-09 | 16-Jun-09 | HMS (18910) | CALIBRATED AND CERTIFIED. |
| 22-Apr-09 | 22-Apr-09 | NMJ (22392) | CALIBRATED, CERTIFIED AND ACCEPTED. |

INTOX EC/IR II

Quality Assurance Worksheet

Instrument Serial Number 010570 Worksheet Start Date 4/10/2014

Location **DFS-Central**

Address

DFS Technician Heather Stanton License No. 18910

> ✓ Laboratory Cn-Site

Site Specification: No detrimental environmental conditions exist. r

Instrument Barometer (mm HG) 760 Reference Barometer (mm HG) 762

Reference Barometer(RB)Serial # 009113 **RB** Calibration Due 5/8/2014

Measurement Assurance Check

Standard (sea level) PA Target minimum maximum 0.306 Sample 1 0.300 0.300 0.291 0.309 Sample 2 0.306 Precision sample min sample max Sample 3 0.305 0.001

0.305

Standard (sea level) PA Target minimum maximum Sample 1 0.101 0.100 0.100 0.097 0.103 Sample 2 0.101

0.306

Precision sample min sample max 0 0.101 0.101

Dry gas standard Lot No. (with tank no.) AG211702-15

Supplies Mouthpieces

I Installed at Location Certificates of Analysis

Operator Worksheet Removed to DFS-Central

Other:

Notes:

Intox EC/IR II QA Worksheet Issued by Calibration and Training Program Manager Issue Date: 9-December-2013

Sample 3

0.101

| Instrument Serial Number | 010570 | | Certification Date | 4/10/2014 | |
|---------------------------------------|----------------------------|---|---|----------------------------------|-------------------------|
| ☐ Calibrated | | Meas | urement Assurance | Check | |
| | tes satisfactory condition | | eshooting/Maintenan | ce Worksheet Completed | b |
| Standard (sea I Precision 0.001 | 0.250 0.250 | minimum 0.242 sample min 0.252 | maximum 0.257 sample max 0.253 | Sample 1 Sample 2 Sample 3 | 0.253 0.253 0.252 |
| Standard (sea I Precision 0 | 0.150 0.150 | minimum 0.145 sample min 0.152 | maximum 0.154 sample max 0.152 | Sample 1 Sample 2 Sample 3 | 0.152 0.152 0.152 |
| Standard (sea l | level) PA Target | minimum | maximum | Sample 1 | 0.081 |

| Precision 0 | | 0.081 | 0.081 | Sample 3 | 0.081 |
|----------------------|-----------|---------|---------|----------|-------|
| Standard (sea level) | PA Target | minimum | maximum | Sample 1 | 0.019 |
| | 0.020 | 0.017 | 0.023 | Sample 2 | 0.019 |

sample min sample max

0.019

0.077

0.083

0.019

All measurements are in g/210L

Precision

0

Estimation of Uncertainty of Measurement and traceability records are located within the Breath Alcohol Section

0.080

Date

Date

0.080

Sample 2

Sample 3

0.081

0.019

mB MB

Intox EC/IR-II: Certification

Department of Forensic Science

Serial Number: 010570 Test Number: 1769 Test Date: 04/10/2014 Test Time: 12:49 EDT

Technician Initials: HMS Dry Gas Target: 0.250

Lot Number: 0771325014-02 Exp Date: 05/01/2015
Tank Pressure: 370 psi Barometric Pressure: 759 mmHg

System Check: Passed

| Test | g/210L | Time |
|------|--------|-------|
| DIAG | Pass | 12:49 |
| BLK | 0.000 | 12:50 |
| CHK | 0.253 | 12:51 |
| BLK | 0.000 | 12:53 |
| CHK | 0.253 | 12:54 |
| BLK | 0.000 | 12:55 |
| CHK | 0.252 | 12:56 |
| BLK | 0.000 | 12:58 |

Success

Standard Value (at sea level): 0.250 g/210L

Certification Status: Continued

Intox EC/IR-II: Certification

Department of Forensic Science

Serial Number: 010570 Test Number: 1770
Test Date: 04/10/2014 Test Time: 13:01 EDT

Technician Initials: HMS
Dry Gas Target: 0.150

Dry Gas Target: 0.150
Lot Number: 0771315013-01 Exp Date: 05/01/2015
Tank Pressure: 938 psi Barometric Pressure: 759 mmHg

System Check: Passed

| Test | g/210L | Time |
|------|--------|-------|
| DIAG | Pass | 13:01 |
| BLK | 0.000 | 13:02 |
| CHK | 0.152 | 13:03 |
| BLK | 0.000 | 13:04 |
| CHK | 0.152 | 13:05 |
| BLK | 0.000 | 13:07 |
| CHK | 0.152 | 13:08 |
| BLK | 0.000 | 13:09 |

Success

Standard Value (at sea level): 0.150 g/210L

Certification Status: Continued

emms Mps

Intox EC/IR-II: Certification

Department of Forensic Science Serial Number: 010570 Test Number: 1771 Test Date: 04/10/2014 Test Time: 13:18 EDT

Technician Initials: HMS
Dry Gas Target: 0.080

Lot Number: 0771308012-02 Exp Date: 05/01/2015
Tank Pressure: 1066 psi Barometric Pressure: 759 mmHg

System Check: Passed

| Test | g/210L | Time |
|------|--------|-------|
| DIAG | Pass | 13:19 |
| BLK | 0.000 | 13:20 |
| CHK | 0.081 | 13:21 |
| BLK | 0.000 | 13:22 |
| CHK | 0.081 | 13:23 |
| BLK | 0.000 | 13:24 |
| CHK | 0.081 | 13:25 |
| BLK | 0.000 | 13:26 |

Success

Standard Value (at sea level): 0.080 g/210L

Certification Status: Continued

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Intox EC/IR-II: Certification

Department of Forensic Science

Serial Number: 010570 Test Number: 1772
Test Date: 04/10/2014 Test Time: 13:29 EDT

Technician Initials: HMS
Dry Gas Target: 0.020

Lot Number: 0771302011-01 Exp Date: 05/01/2015
Tank Pressure: 625 psi Barometric Pressure: 759 mmHg

System Check: Passed

| Test | g/210L | Time |
|------|--------|-------|
| DIAG | Pass | 13:29 |
| BLK | 0.000 | 13:30 |
| CHK | 0.019 | 13:31 |
| BLK | 0.000 | 13:32 |
| CHK | 0.019 | 13:33 |
| BLK | 0.000 | 13:34 |
| CHK | 0.019 | 13:35 |
| BLK | 0.000 | 13:37 |
| BLK | 0.000 | 13:37 |

Success

Standard Value (at sea level): 0.020 g/210L

Certification Status: Success



Intox EC/IR-II: Accuracy Check

Department of Forensic Science

Serial Number: 010570 Test Number: 1773 Test Date: 04/10/2014 Test Time: 13:40 EDT

Dry Gas Target: 0.300

Lot Number: AG321804-03 Exp Date: 08/06/2015

Tank Pressure: 188 psi Barometric Pressure: 759 mmHg

System Check: Passed

| Test | g/210L | Time |
|------|--------|-------|
| BLK | 0.000 | 13:40 |
| CHK | 0.306 | 13:41 |
| BLK | 0.000 | 13:43 |
| CHK | 0.306 | 13:44 |
| BLK | 0.000 | 13:46 |
| CHK | 0.305 | 13:47 |

Test Status: Success

Calibration CRC: 5626B5CC

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Intox EC/IR-II: Accuracy Check

Department of Forensic Science

Serial Number: 010570 Test Number: 1774 Test Date: 04/10/2014 Test Time: 13:49 EDT

Dry Gas Target: 0.100

Lot Number: AG211702-15 Exp Date: 04/26/2014

Tank Pressure: 272 psi Barometric Pressure: 758 mmHg

System Check: Passed

| Test | g/210L | Time |
|------|--------|-------|
| BLK | 0.000 | 13:50 |
| CHK | 0.101 | 13:51 |
| BLK | 0.000 | 13:52 |
| CHK | 0.101 | 13:53 |
| BLK | 0.000 | 13:55 |
| CHK | 0.101 | 13:55 |

Test Status: Success

Calibration CRC: 5626B5CC

INSTRUMENT, TEST,

DFS

STANTON, HEATHER, M

DFS Central Lab

18910

10/01/2014 04/10/2014

010570

04/10/2014

14:08 EDT

0.00



IntoxNet MIS Report

Report Generated 10 Apr 2014 at 14:14



Test Results

Instrument Serial Number 010570

Test # 001775 Subject Test Test Location 1 Department of

Test Date 10 Apr 2014

Operator's Last Name STANTON

Agency DFS Central Lab

Card Serial Number 118910 Subject's Last Name INSTRUMENT

Subject's Middle Initial

Driver's License Number

Blow Sample Number 1

Driver's License State

Test Location 2 Forensic Science

Test Time 14:01 Remote/Local Local

Test Location 3

System Check Passed

Operator's First Name HEATHER

Operator's Middle Initial M

License Number 18910

Effective Date 10/01/2012

Expiration Date 10/01/2014

Subject's First Name TEST

Subject's Date of Birth 00/00/0000

Subject's Sex Male Driver's License Expiration 00/00/0000

Court Name DFS

End Date 10 Apr 2014 End Time 14:09 Result Time 14:08 Result Date 10 Apr 2014 Result 0.00 Data Type DIAG Sample Value Pass Sample Time 14:01 Data Type BLK Sample Value 0.000 Sample Time 14:02 Data Type CHK Sample Value 0.101 Sample Time 14:03 Data Type BLK Sample Value 0.000 Sample Time 14:04 Data Type SUBJ Sample Value 0.000 Sample Time 14:05 Data Type BLK Sample Value 0.000 Sample Time 14:06 Data Type SUBJ Sample Value 0.000 Sample Time 14:08 Data Type BLK Sample Value 0.000 Sample Time 14:09

Standard Type Dry Gas Std Standard Lot Number AG211702-15

Tank Pressure 267

Blow Duration 3.32 sec Blow Duration 3.21 sec Blow Volume 1781 cc

Barometric Pressure 759 mmHg Blow Volume 1861 cc

End-of-Blow Time 14:05

Blow Sample Number 2 Tamper Evident Stamp 346b7d3a

Test Status Success

End-of-Blow Time 14:08 Test Status Code 0

Standard Value 0.100

Standard Expiration Date 04/26/2014